JD JENDIGITAL C1.3SD

User's Guide

www.jenoptik-camera.com

ENGLISH

This manual is designed to assist you in using the JDC1.3SD. Information in this document has been carefully checked for accuracy; however, no guarantee is given to the absolute correctness of the contents.The information in this document is subject to change without notice. © Copyright 2005 Concord Camera Corp.

FEDERAL COMMUNICATIONS COMMISSION (FCC) COMPLIANCE

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and the receiver.
- Connect the equipment to an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

Note!
Changes or modifications not expressly approved by the party responsible for compliance could void your authority to operate the equipment.

Use of shielded cable is required to comply with Class B limits in Subpart B of Part 15 of the FCC rules. Do not make any changes or modifications to the equipment unless otherwise specified in the manual. If such changes or modifications should be made, you could be required to stop operation of the equipment.

DECLARATION OF CONFORMITY

This device complies with part 15 of the FCC rules. Operation is subject to the following conditions:
This device may not cause harmful interference.
This device must accept any interference received, including interference that may cause undesired operation.

CANADIAN DEPARTMENT OF COMMUNICATIONS

This class B digital apparatus meets all requirements of the Canadian Interference-causing Equipment Regulations.

TRADEMARK RECOGNITION

Concord, and the Concord logo are registered trademarks or trademarks of Concord Camera Corp., in the United States and/or other countries. Windows (an abbreviated term referring to the Microsoft Windows Operation System), NetMeeting, and Media Player are registered trademarks and products of Microsoft Corporation registered in the USA and other countries. Ulead PhotoExplorer 8.0 SE and COOL 360 are products and trademarks of Ulead Inc. Other corporate, product names, or trade references are

trademarks or registered trademarks of their respective companies.

GENERAL WARNINGS

When fitting batteries into the camera, check the polarity of the batteries (- and +) to ensure that you insert the battery correctly. Incorrect polarity may result in the batteries splitting or leaking and causing a fire, injury, or soiling of the battery compartment. Remove the batteries if the camera will not be used for an extended period of time. The batteries may leak and cause a fire, injury or soiling of the battery compartment. If the batteries leak, clean and wipe the battery compartment carefully and install new batteries. Wash your hands carefully if you touch the battery fluid.

WARNING: *Handling the USB cable on this product may expose you to lead, a chemical known to the State of California to cause birth defects or other reproductive harm. Wash your hands after handling.*

NOTE FOR THE BUILT-IN MEMORY

The JDC1.3SD camera uses a type of internal memory that continually draws power to retain pictures and/or video clips in the camera's internal memory, even when the camera is powered off. If the batteries are dead or removed before turning off the camera for more than 30 seconds, all the pictures and/or video clips stored in the internal memory will be lost.

If the camera detects the low battery power, it is strongly recommended, when using the internal memory for the storage of images and /or video clips, that you transfer your images and/or video clips to the computer promptly.

The JDC1.3SD camera also works with the SD memory card which can store the pictures and /or video clips even if the batteries are depleted or removed.

NOTE FOR SETTING DIFFERENT "MODES"

After selecting the desired mode, press Shutter button within 3 seconds to activate the selected mode otherwise the camera will go back to default Capture mode.

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GENERAL INFORMATION

COMPUTER SYSTEM REQUIREMENTS

The JDC1.3SD is designed to work with your home or office computer. To ensure proper operation your computer must meet the following requirements:

- Pentium II Class 400 MHz processor
- Windows® 98SE/ME/2000/XP
- 128MB RAM
- 310MB free hard disk space
- USB port
- CD-ROM drive

PACKAGE CONTENTS

Open the JDC1.3SD package and examine the contents. Your package should contain the following items. Note, however, that items included with your camera kit may vary slightly depending upon the options selected by your camera retailer. Check with your retailer for details, as options will vary by retailer.

- JDC1.3SD
- Camera wrist strap
- 3 AAA batteries
- USB cable
- User's Guide
- Software CD containing:
  - JDC1.3SD Driver
  - Owner's Manual (PDF)
  - Ulead Photo Explorer 8.0SE Basic
  - Ulead COOL 360
  - Adobe Acrobat Reader

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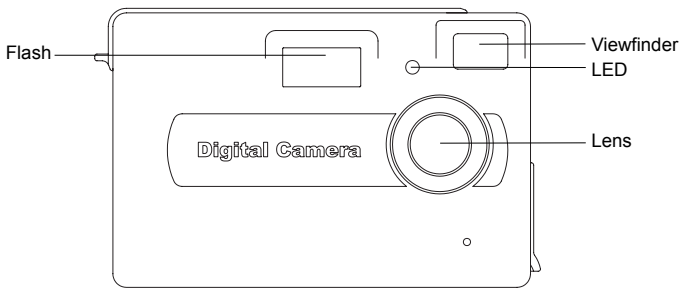
GETTING STARTED

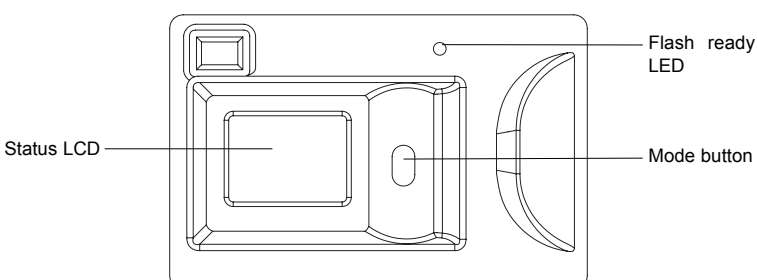
IDENTIFYING COMPONENTS

The following diagrams identify the JDC1.3SD components:

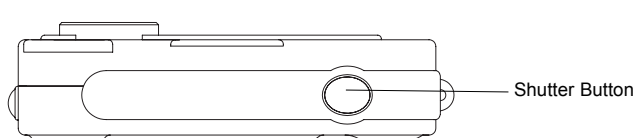
Front



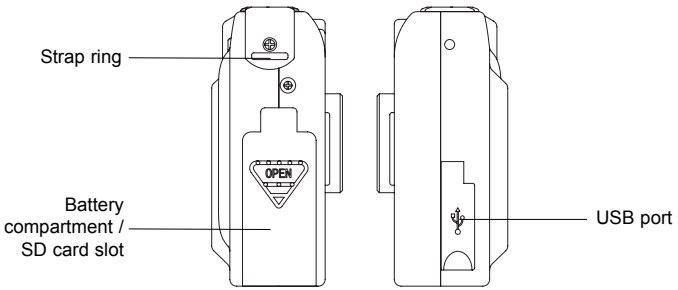
Back



Top



Side



HOW TO INSERT/REMOVE SD MEMORY CARD

The JDC1.3SD accepts a Secure Digital (SD) memory card up to 512MB capacity. The memory card takes priority over the internal memory. Whenever a memory card is inserted the camera will immediately use the memory card in preference to the internal memory. Therefore, when a memory card is inserted, the camera will store images and videos on the memory card. The images and video clips already stored on the internal memory will not be transferred to the memory card.

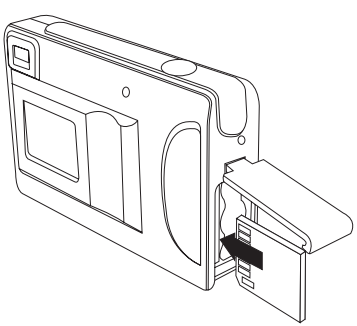
Inserting a Memory Card

Insert an SD card into the memory card slot located on the side of the camera, and gently press down with your finger.

Removing a Memory Card

Gently press down on the memory card and it will partially eject. Pull the card out with your fingers.

Note: *To use the internal memory (8MB), please remove the memory card first. Memory card is recommended to avoid loss of images due to dead battery.*



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USING THE JDC1.3SD

POWERING THE CAMERA ON/OFF

- To power the camera on, press and hold the ⏻/M button (approx. 2 seconds) until a three-digital number displays on the LCD. The camera will beep and the status LCD will display camera status information.
- To power the camera off, press and hold the ⏻/M button (approx. 3 seconds).

Note:

1. *The JDC1.3SD automatically powers off after 60 seconds of inactivity.*
2. *Power Off the camera before removing batteries.*

CAMERA ICONS AND DESCRIPTIONS

Icons	Descriptions
000	**Capture Mode** for capturing digital still images
	Self-timer allows 10 seconds to caputure an image.
	Movie Mode for capturing video clips
CS	**Continuous shooting** allows to take 3 continuous shots.
	Delete All: Delete all images and/or videos saved in the camera memory or on a memory card.
	Delete Last: Deletes the last image or video stored in the camera or the memory card.
SEt	**Setup** menu to set flash, resolution, compressed or non-compressed mode, U-disk, PC camera mode and frequency.
SoF	**Flash Off:** The flash will not fire in any lighting condition.
SOn	**Flash On:** The camera will flash regardless of lighting conditions.
SAU	**Automatic Flash:** The flash will fire if there is insufficient ambient light.
5-3	Resolution settings for still images
5-4	
5-5	
5-1	
5-2	
HQ	For compressed mode
SQ	For non-compressed mode to take clear pictures
Sto	The camera can be used as a removable storage disk in this mode.

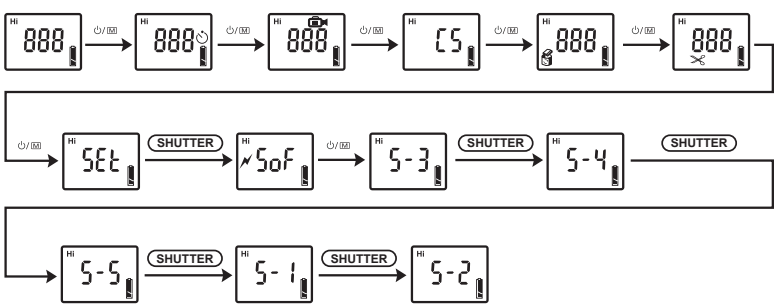
PCC	You may use the camera as a web camera for video conferencing.
50	You may set the camera's frequency to 50HZ.
60	You may set the camera's frequency to 60HZ.
ESC	For exiting the setup menu
	Battery level indicator

CAPTURING DIGITAL STILL IMAGES

1. Press and hold the ⏻/Ⓜ button (approx. 2 seconds) to turn on the camera.
2. Frame your subject through the viewfinder.
3. Hold the camera steady and press the Shutter button firmly to capture an image. The camera will beep to confirm that the image has been captured, and the status LCD will increment by one.

SETTING IMAGE RESOLUTION

1. Press and hold the ⏻/Ⓜ button to power on the camera, the resolution is set automatically to 1280 x 1024.
2. Follow the below flow chart to select the desired image resolution.



5-1	640 x 480	VGA, reduced resolution
5-2	1024 x 768	1 MP resolution
5-3	1280 x 1024	1.3 MP native resolution
5-4	1600 x 1200	2 MP interpolated
5-5	2048 x 1536	3 MP interpolated

The 5-3 resolution setting (1280 x 1024) is suggested for general use. The 5-5 resolution will yield a 3 mega-pixel image (2048 x 1536) that is generated (calculated) by a process called interpolation, inside the camera. Superfine images will include finer detail than their 1.3 mega-pixel equivalents, however, they will consume more memory space. Images captured in 5-1 (640 x 480) will have noticeably less detail but require less memory space in the camera. Try capturing some images in all three resolutions and compare the results.

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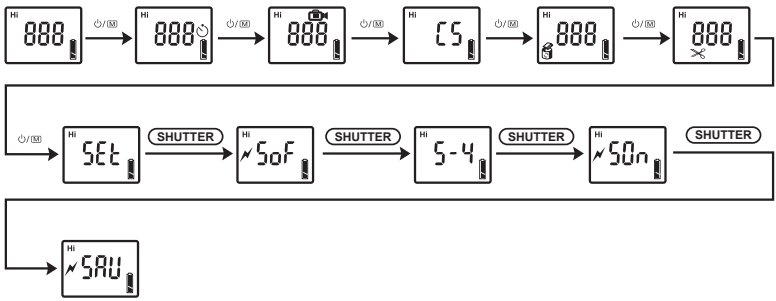
USING THE FLASH

1. Press the ⏻/Ⓜ button to turn on the camera.
2. Press the ⏻/Ⓜ button six times until the setup menu appears on the LCD.
3. Follow the below flow chart to select the desired flash mode:



3. Frame your subject through the viewfinder.
4. Hold the camera steady and press the Shutter button firmly to capture an image.

Note:

1. *If the flash is charging , the flash icon on the status LCD will blink. The camera will not capture an image while this icon is blinking. Wait for the icon to stop blinking before capturing an image.*
2. *The flash will yield best results when the subject is 5 feet (1.5 meters) away from the camera. The image may be over exposed if you hold the camera too close to your subject (e.g.less than 5 feet or 1.5 meters away.)*
3. *The flash setting will be deactivated to the flash off mode if the battery indicator shows only one segment. Change or recharge the battery to replenish power before using the camera with the flash.*
4. *The flash is deactivated in the Movie mode.*

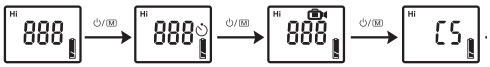
USING THE SELF-TIMER

1. Press and hold the ⏻/Ⓜ button to turn on the camera.
2. Press the ⏻/Ⓜ button once to enter the self-timer mode.

3. Place your camera on a tripod (or a flat surface) and frame the subject through the viewfinder.
4. When ready to capture an image, press the Shutter button once to start the timer. The camera will beep and the LED will blink slowly. As the time counts down to 3 seconds, the camera will beep and flash faster.

USING THE CONTINUOUS SHOOTING

1. Press and hold the ⏻/Ⓜ button to turn on the camera.
2. Press the ⏻/Ⓜ button thrice to enter the continuous shooting mode.



3. Shoot the image. The camera will capture 3 continuous pictures in 640 x 480 resolution.

RECORDING DIGITAL VIDEO

1. Press and hold the ⏻/Ⓜ button (approx. 2 seconds) to turn on the camera.
2. Press the ⏻/Ⓜ button twice to enter the video mode.

3. Frame your subject through the viewfinder and press the Shutter button once to start recording.
4. To stop recording a video, press the Shutter button again. The status LCD will display the maximum duration of a video-clip that you can capture based upon the memory.

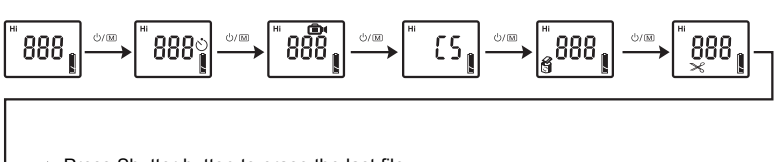
Note:
The Movie mode deactivates the flash.
If an external memory card is used, the camera will store video on the card.

DELETING IMAGE AND VIDEO FILES

This function allows you to delete images and videos stored on your JDC1.3SD, or on a memory card.

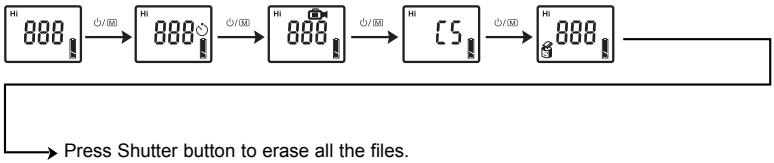
Deleting the Last File

1. Press and hold the ⏻/Ⓜ button (approx. 2 seconds) to turn on the camera.
2. Press the ⏻/Ⓜ button five times to enter the mode to delete the last file.



Deleting All Files

1. Press and hold the ⏻/Ⓜ button (approx. 2 seconds) to turn on the camera.
2. Press the ⏻/Ⓜ button four times to enter the mode to delete all the files.



3. Please note that if a memory card is used, the camera will delete images from the memory card only. If you want to delete images from internal memory, please remove the memory card and select Delete ALL again.

After a deletion the status display updates to reflect the amount of memory by showing more storable number for still image or recordable seconds for movie. The higher resolution setting (5-5, 5-4) corresponds to the lower number for image storage due to the larger file size, yet containing more details.

Note:

1. *Delete ALL is the equivalent of formatting the memory card or the internal memory. Please download all your images and videos before "deleting all". Refer to the section "Downloading Files to Your PC".*
2. *The files set to Read-Only in the SD card will be deleted after formatting the memory card.*

SOFTWARE INSTALLATION GUIDE

INTRODUCTION TO SOFTWARE APPLICATIONS

Option	Description
Camera Driver	For Windows 98SE/2000/ME/XP, the camera driver is required for installation so that the camera can work with the PC Cam mode, and the still images and video clips can be transferred to the computer from the camera under Windows 98SE.
Ulead Photo Explorer 8.0 SE Basic	For Windows 98SE and 2000, you need to install this software which enables the video clips to be played back on the computer.This software can be used for editing and enhancing the images.
Ulead COOL 360	This software allows to stitch a series of still pictures into panorama.
Adobe Acrobat Reader	Adobe Acrobat Reader enables you to view the electronic version of the User's Guide.

INSTALLING SOFTWARE APPLICATIONS

Step 1. Make sure that your camera is not connected to the computer. Insert the supplied CD-ROM into the CD-ROM drive.
The Installer Splash Screen will appear automatically. If it does not appear, double click on the CD-ROM drive icon, then double click on the autorun icon after you locate the CD-ROM drive on your computer via "My Computer" on the desktop or "Start Menu".

Setp 2. Click on the application item directed by the button located on the installer screen.

Note:
- *To enable the movie playback under Windows 98SE and 2000, you need to install the Ulead Photo Explorer*
- *Restart the computer after the installation of Ulead PhotoExplorer SE Basic is completed.*
- *Concord Support Website: Direct link to our camera support website. Please establish an internet connection before clicking on the link.*

Setp 3. Follow the on-screen instructions to complete the installation.

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DOWNLOADING THE STILL IMAGES/VIDEO CLIPS TO THE COMPUTER

Note:
For Windows 98SE, do not connect the camera to the computer before the camera driver installation is completed.

1. Connect the camera to the computer by plugging the small end of the USB cable into the camera and the larger end into the USB port of the computer (located either at the back of the computer or in the front panel).
   - The camera will be powered on.
   - Ensure " StO " is displayed on the LCD of the camera for the Mass Storage connection to the computer.
   - The computer will detect and recognize the camera, and automatically complete the camera installation to the computer as a removable disk.

2. a) For Windows XP, the Windows Wizard will launch, you may select "Open folders to view files" from the listed operation items, then click OK to proceed to Step 3 below. For selecting the other listed operation items,follow the on-screen instructions to proceed and complete.

Removable Disk (F:)
Windows can perform the same action each time you insert a disk or connect a device with this kind of file:
Video files
What do you want Windows to do?
Play
using Windows Media Player
Open folder to view files
using Windows Explorer
Take no action
Always do the selected action.
OK
Cancel

   b) For Windows 98SE/ME/2000, double click on My Computer.
3. Locate and double click on Removable Disk.
4. Locate and double click on DCIM.
5. Locate and double click on 100IMAGE.
   - The stored pictures and video clips in the memory will be displayed.
   - **To play back the video clips, double click on the desired video file. For Windows 98SE and 2000, the movie playback is required for the installation of Ulead Photo Explorer SE Basic which is bundled with the supplied CD-ROM.**

6. Click and drag the files into a directory in your computer to save them.

USING JDC1.3SD AS A WEB CAMERA

You may also use the camera as a web camera and a video conferencing camera.

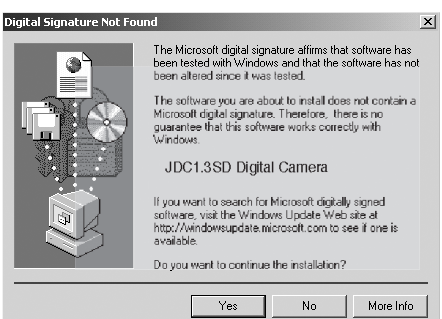
Note:
The camera driver must be installed before connecting the camera to the computer to play PC Cam for the first time.

1. Install the camera driver from the supplied CD-ROM.
2. Power on the camera, and press the ⏻/Ⓜ button until " PCC " is displayed on the LCD of the camera.
   • The display of " PCC " on the LCD indicates the camera's entry to the PC Cam mode.

3. Connect the camera to the computer.
4. Launch Microsoft NetMeeting software.

Note:
If you do not have NetMeeting already installed on your computer, please visit www. microsoft.com for instructions and free download.

Under Windows 2000
When the camera is used in the PC Cam mode and connected to the computer for the first time, the warning message of "Digital Signature Not Found" will pop up. Click"Yes" to continue to complete the installation.


Digital Signature Not Found
The Microsoft digital signature affirms that software has been tested with Windows and that the software has not been altered since it was tested.
The software you are about to install does not contain a Microsoft digital signature. Therefore, there is no guarantee that this software works correctly with Windows.
JDC1.3SD Digital Camera
If you want to search for Microsoft digitally signed software, visit the Windows Update Web site at http://windowsupdate.microsoft.com to see if one is available.
Do you want to continue the installation?
Yes
No
More Info

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CAMERA MAINTENANCE

CARING FOR YOUR CAMERA

Do not store or use the camera in the following environments:

- Very humid, dirty or dusty places.
- In direct sunlight or in places subject to extreme temperatures, such as in a closed car during summer.
- Extremely cold places.
- Places that are subject to strong vibrations, smoke, or steam.
- Places that are subject to strong magnetic fields (near motors, transformers or magnets).
- Places with chemicals such as pesticides or next to rubber or vinyl products for a long period of time.
- In the rain or snow.

OPERATIONAL & STORAGE ENVIRONMENT

Store your JDC1.3SD in a cool, dry place if you do not intend to use it for a long period of time. Remove the batteries if the camera will not be used for more than 10 days. Do not exceed the following temperature and humidity ranges when using and storing your JDC1.3SD.

Operating Temperature	32°F - 104°F (0°C - 40°C)
Operating Humidity	30% - 90% RH
Storage Temperature	-40°F - 158°F (-40°C - 70°C)
Storage Humidity	10% - 85% RH

CLEANING JDC1.3SD

Use a small soft brush or lens pen to remove dust from the lens and LCD surface. Wipe the surface lightly with a soft, lint-free dry cloth. If needed, apply a small amount of lens cleaning liquid to a piece of lens cleaning paper and wipe it gently. Do not apply cleaning liquid directly to the lens. Do not touch the lens with your fingers. Do not scratch any part of the camera with sharp objects. Clean the camera's body with a soft, dry cloth. Do not use volatile substances such as thinners, benzene or insecticide, as these may react with camera body and cause deformation to the camera.

PRODUCT SPECIFICATIONS

<table>
<tr><td>Sensor</td><td>1.3 Mega Pixel sensor</td></tr>
<tr><td>Internal memory</td><td>8 MB built-in memory(SDRAM)</td></tr>
<tr><td>Image resolution</td><td>5-1: 640 x 480
5-2: 1024 x 768
5-3: 1280 x 1024
5-4: 1600 x 1200[1]
5-5: 2048 x 1536[1]</td></tr>
<tr><td>Image capacity[2]</td><td>Images Stored (approx.)
<table>
<tr><td rowspan="2">Image Quality</td><td colspan="5">Image Size</td></tr>
<tr><td>2048x1536[1]</td><td>1600x1200[1]</td><td>1280x1024</td><td>1024x768</td><td>640x480</td></tr>
<tr><td>Normal</td><td>6</td><td>10</td><td>15</td><td>20</td><td>37</td></tr>
<tr><td>Economic</td><td>10</td><td>18</td><td>24</td><td>40</td><td>55</td></tr>
</table></td></tr>
<tr><td>Video resolution</td><td>320x240, 10fps</td></tr>
<tr><td>File format</td><td>JPEG (still images), AVI (video clips – no audio)</td></tr>
<tr><td>Exposure</td><td>Automatic</td></tr>
<tr><td>White balance</td><td>Automatic</td></tr>
<tr><td>Lens focal length</td><td>f=8.34mm</td></tr>
<tr><td>Flash Modes</td><td>Automatic, on (fill), off</td></tr>
<tr><td>Display</td><td>Monochrome status LCD</td></tr>
<tr><td>Computer interface</td><td>USB 1.1</td></tr>
<tr><td>Power source</td><td>3 AAA batteries(1.5V)</td></tr>
<tr><td>Power Management</td><td>Camera powers-off after 60 seconds of inactivity</td></tr>
<tr><td>OS support</td><td>Windows 98SE/ME/2000/XP</td></tr>
</table>

1. By internal interpolation. Native resolution is 1280 x 1024.
2. Image and video capacity varies depending upon scene content and complexity.

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TROUBLESHOOTING

If any problems arise with the JDC1.3SD, refer to this troubleshooting chart:

Symptom	Possible cause	Solution
The camera doesn't turn on.	The battery is drained.	Change or recharge the battery. Also, check for correct polarity (orientation) of the batteries.
	Power button must be pressed for 3 to 4 seconds	Press and hold the Power button until "ON" appears in the status display.
The camera won't capture a image.	Is the camera turned on?	The camera powers off automatically after 60 seconds. Make sure the camera's power is ON before taking an image.
	Is the camera connected to a computer?	The camera's buttons are not functional when connected to a PC. Disconnect the camera to capture more images.
	The light condition is insufficient.	Turn the flash mode to Flash ON.
	The camera is processing.	Wait for the camera to store files. The image number blinks at status LCD while the camera is processing and stops blinking when the camera is ready for use.
Can't download images to the PC.	Connection may have failed, and make sure that " Sto " is displayed on the LCD of the camera.	Check to ensure that all connections are secure. Look for Removable Disk under My Computer.
Can't play back the video clips on the computer under Windows 98SE or Windows 2000.	The software of Ulead Photo Explorer SE Basic from the supplied CD-ROM has not been installed on your computer.	Install Ulead Photo Explorer SE Basic from the supplied CD-ROM, and restart your computer after installing it.
Can't play PC Cam on the computer.	The camera driver from the supplied CD-ROM has not been installed on your computer.	Install the camera driver from the supplied CD-ROM.
	Make sure " PCC " is displayed on the LCD of the camera.	Press the ⏻/Ⓜ button until " PCC " is displayed on the LCD of the camera.
I get a blurred image when downloading my images to my computer.	There may be a momentary delay between pressing the shutter button and the actual exposure.	Hold your camera steady until you hear a "beep" which indicates the exposure is completed.

GETTING HELP

You can get help from the troubleshooting section, FAQ or Customer Support on our website.

Troubleshooting Section in this User's Guide
Please refer to the Troubleshooting section first, as it contains some of the most common problems that users encounter.

Website FAQ
Please visit our website at *www.jenoptik-camera.com* to view the Frequently Asked Questions (FAQ).

Website Customer Support
If the problem you are encountering is not listed in the FAQ section, please send us an email through our web site by clicking on Contact Us.

If you have questions concerning the operation of the camera or software installation, please have the following information ready before you contact us:

Camera Information:
Name of camera model:
Camera Serial Number:

Computer Information:
Operation System:
Computer Maker and Model:
Exact Error Message Received:

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